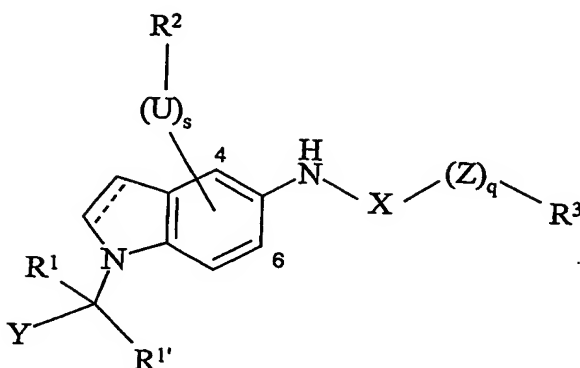


Claims

1 A substituted indoline or indole derivative of the general formula I



(I)

wherein

the dotted line represents an optional bond;

R^1 and $R^{1'}$ are independently selected from the group consisting of hydrogen, C_{1-6} -alk(en/yn)yl, C_{3-8} -cycloalk(en)yl, C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, hydroxy- C_{1-6} -alk(en/yn)yl, hydroxy- C_{3-8} -cycloalk(en)yl, hydroxy- C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, halo- C_{1-6} -alk(en/yn)yl, halo- C_{3-8} -cycloalk(en)yl, halo- C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, cyano- C_{1-6} -alk(en/yn)yl, cyano- C_{3-8} -cycloalk(en)yl and cyano- C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl; or

R^1 and $R^{1'}$ together with the carbon atom to which they are attached form a 3-8 membered saturated or unsaturated ring which optionally contains 1 or 2 heteroatoms;

s is 0 or 1;

U is O, NR^{11} , S, SO_2 , SO_2NR^{11} , CO-O or CO- NR^{11} ; wherein R^{11} is selected from the group consisting of hydrogen, C_{1-6} -alk(en/yn)yl, C_{3-8} -cycloalk(en)yl, C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl; or R^2 and R^{11} together with the nitrogen atom to

which they are attached form a 4-8 membered saturated or unsaturated ring which optionally contains 1, 2 or 3 further heteroatoms;

R^2 is selected from the group consisting of hydrogen, C_{1-6} -alk(en/yn)yl, C_{3-8} -cycloalk(en)yl, C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, Ar, Ar- C_{1-6} -alk(en/yn)yl, Ar- C_{3-8} -cycloalk(en)yl, Ar- C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, acyl, hydroxy- C_{1-6} -alk(en/yn)yl, hydroxy- C_{3-8} -cycloalk(en)yl, hydroxy- C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, halogen, halo- C_{1-6} -alk(en/yn)yl, halo- C_{3-8} -cycloalk(en)yl, halo- C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, cyano, cyano- C_{1-6} -alk(en/yn)yl, cyano- C_{3-8} -cycloalk(en)yl, cyano- C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, $-NO_2$, $NR^{10}R^{10'}$ - C_{1-6} -alk(en/yn)yl, $NR^{10}R^{10'}$ - C_{3-8} -cycloalk(en)yl and $NR^{10}R^{10'}$ - C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl; wherein

R^{10} and $R^{10'}$ are independently selected from the group consisting of hydrogen, C_{1-6} -alk(en/yn)yl, C_{3-8} -cycloalk(en)yl, C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, hydroxy- C_{1-6} -alk(en/yn)yl, hydroxy- C_{3-8} -cycloalk(en)yl, hydroxy- C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, halo- C_{1-6} -alk(en/yn)yl, halo- C_{3-8} -cycloalk(en)yl, halo- C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, cyano- C_{1-6} -alk(en/yn)yl, cyano- C_{3-8} -cycloalk(en)yl and cyano- C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, or

R^{10} and $R^{10'}$ together with the nitrogen atom to which they are attached form a 4-8 membered saturated or unsaturated ring which optionally contains 1, 2 or 3 further heteroatoms;

with the proviso that when R^2 is NO_2 , halogen or cyano then s is 0; and

with the proviso that when R^2 is a hydrogen atom or acyl and s is 1 then U is NR^{11} , O or S;

wherein the group $-(U)_s-R^2$ is linked to position 4 or 6 of the indole or indoline;

q is 0 or 1;

Z is O or S;

X is CO or SO_2 ; with the proviso that q is 0 when X is SO_2 ;

R^3 is selected from the group consisting of C_{1-6} -alk(en/yn)yl, C_{3-8} -cycloalk(en)yl, heterocycloalk(en)yl, C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, C_{1-6} -alk(en/yn)yl- C_{3-8} -cycloalk(en)yl, C_{1-6} -alk(en/yn)yl-heterocycloalk(en)yl, Ar, Ar- C_{1-6} -alk(en/yn)yl, Ar- C_{3-8} -cycloalk(en)yl, Ar-heterocycloalk(en)yl, Ar- C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, Ar- C_{1-6} -alk(en/yn)yl- C_{3-8} -cycloalk(en)yl, Ar- C_{1-6} -alk(en/yn)yl-heterocycloalk(en)yl, C_{1-6} -alk(en/yn)yl-oxy- C_{1-6} -alk(en/yn)yl, C_{3-8} -cycloalk(en)yl-oxy- C_{1-6} -alk(en/yn)yl, C_{1-6} -alk(en/yn)yl-oxy- C_{3-8} -cycloalk(en)yl, C_{1-6} -alk(en/yn)yl-oxy-heterocycloalk(en)yl, Ar-oxy- C_{1-6} -alk(en/yn)yl, Ar- C_{1-6} -alk(en/yn)yl-oxy- C_{1-6} -alk(en/yn)yl, C_{1-6} -alk(en/yn)yl-oxy-carbonyl- C_{1-6} -alk(en/yn)yl, C_{3-8} -cycloalk(en)yl-oxy-carbonyl- C_{1-6} -alk(en/yn)yl, C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl-oxy-carbonyl- C_{1-6} -alk(en/yn)yl, hydroxy- C_{1-6} -alk(en/yn)yl, hydroxy- C_{3-8} -cycloalk(en)yl, hydroxy-heterocycloalk(en)yl, hydroxy- C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, hydroxy- C_{1-6} -alk(en/yn)yl- C_{3-8} -cycloalk(en)yl, hydroxy- C_{1-6} -alk(en/yn)yl-heterocycloalk(en)yl, halo- C_{1-6} -alk(en/yn)yl, halo- C_{3-8} -cycloalk(en)yl, halo-heterocycloalk(en)yl, halo- C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, halo- C_{1-6} -alk(en/yn)yl- C_{3-8} -cycloalk(en)yl, halo- C_{1-6} -alk(en/yn)yl-heterocycloalk(en)yl, halo- C_{1-6} -alk(en/yn)yl-Ar, halo- C_{3-8} -cycloalk(en)yl-Ar, halo- C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl-Ar, halo- C_{1-6} -alk(en/yn)yl- C_{3-8} -cycloalk(en)yl-Ar, cyano- C_{1-6} -alk(en/yn)yl, cyano- C_{3-8} -cycloalk(en)yl, cyano-heterocycloalk(en)yl, cyano- C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, cyano- C_{1-6} -alk(en/yn)yl- C_{3-8} -cycloalk(en)yl, cyano- C_{1-6} -alk(en/yn)yl-heterocycloalk(en)yl, acyl- C_{1-6} -alk(en/yn)yl, acyl- C_{3-8} -cycloalk(en)yl, acyl-heterocycloalk(en)yl, acyl- C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, acyl- C_{1-6} -alk(en/yn)yl- C_{3-8} -cycloalk(en)yl, acyl- C_{1-6} -alk(en/yn)yl-heterocycloalk(en)yl and $-NR^{12}R^{12'}$, optionally substituted $NR^{12}R^{12'}$ - C_{1-6} -alk(en/yn)yl, optionally substituted $NR^{12}R^{12'}$ - C_{3-8} -cycloalk(en)yl, optionally substituted $NR^{12}R^{12'}$ - C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl; wherein R^{12} and $R^{12'}$ are independently selected from the group consisting of hydrogen, C_{1-6} -alk(en/yn)yl, C_{3-8} -cycloalk(en)yl, C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, Ar, Ar- C_{1-6} -alk(en/yn)yl, Ar- C_{3-8} -cycloalk(en)yl, Ar- C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, hydroxy- C_{1-6} -alk(en/yn)yl, hydroxy- C_{3-8} -cycloalk(en)yl, hydroxy- C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, halo- C_{1-6} -alk(en/yn)yl, halo- C_{3-8} -cycloalk(en)yl, halo- C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, cyano- C_{1-6} -

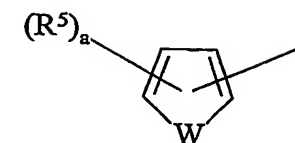
alk(en/yn)yl, cyano-C₃₋₈-cycloalk(en)yl and cyano-C₃₋₈-cycloalk(en)yl-C₁₋₆-alk(en/yn)yl, or

R¹² and **R**^{12'} together with the nitrogen atom to which they are attached form a 4-8 membered saturated or unsaturated ring which optionally contains 1, 2 or 3 further heteroatoms;

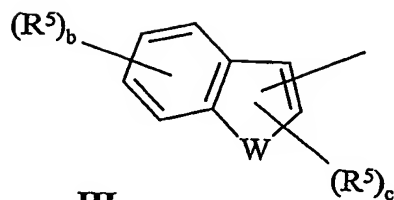
with the proviso that when **R**³ is **NR**¹²**R**^{12'} then q is 0;

and

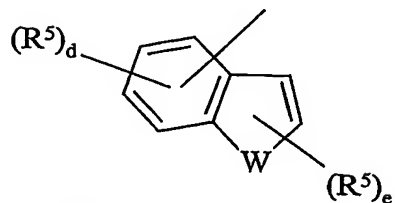
Y represents a group of formula **II**, **III**, **IV**, **V**, **VI**, **XXX** and **XXXI**:



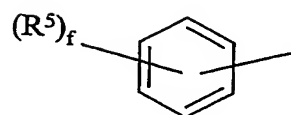
II



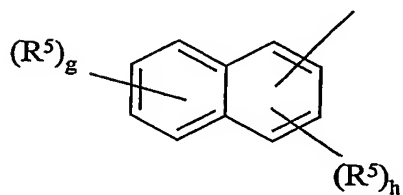
III



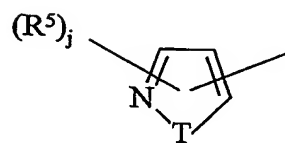
IV



V

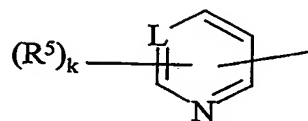


VI



XXX

or



XXXI

wherein

5 the line represents a bond attaching the group represented by Y to the carbon atom;

W is O or S;

10 T is N, NH or O;

L is N, C or CH;

a is 0, 1, 2 or 3;

5 **b** is 0, 1, 2, 3 or 4;

c is 0 or 1;

d is 0, 1, 2 or 3;

10

e is 0, 1 or 2;

f is 0, 1, 2, 3, 4 or 5;

15 **g** is 0, 1, 2, 3 or 4;

h is 0, 1, 2 or 3;

20

j is 0, 1, 2 or 3; with the proviso that when **T** is a nitrogen atom then **j** is 0, 1, 2 or 3; and when **T** is NH or an oxygen atom then **j** is 0, 1 or 2;

k is 0, 1, 2, 3 or 4; and

25

each **R**⁵ is independently selected from the group consisting of a C₁₋₆-alk(en/yn)yl, C₃₋₈-cycloalk(en)yl, C₃₋₈-cycloalk(en)yl-C₁₋₆-alk(en/yn)yl, Ar, Ar-C₁₋₆-alk(en/yn)yl, Ar-thio, Ar-oxy, acyl, C₁₋₆-alk(en/yn)yl-oxy, C₃₋₈-cycloalk(en)yl-oxy, C₃₋₈-cycloalk(en)yl-C₁₋₆-alk(en/yn)yl-oxy, halogen, halo-C₁₋₆-alk(en/yn)yl, halo-C₃₋₈-cycloalk(en)yl, halo-C₃₋₈-cycloalk(en)yl-C₁₋₆-alk(en/yn)yl, -CO-NR⁶R^{6'}, cyano, cyano-C₁₋₆-alk(en/yn)yl, cyano-C₃₋₈-cycloalk(en)yl, cyano-C₃₋₈-cycloalk(en)yl-C₁₋₆-alk(en/yn)yl, -NR⁷R^{7'}, -S-R⁸ and -SO₂R⁸, or
30 two adjacent **R**⁵ together with the aromatic group to which they are attached form a 4-8 membered ring which optionally contains one or two heteroatoms;

R^6 and $R^{6'}$ are independently selected from the group consisting of hydrogen, C_{1-6} -alk(en/yn)yl, C_{3-8} -cycloalk(en)yl, C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl and Ar;

5 R^7 and $R^{7'}$ are independently selected from the group consisting of hydrogen, C_{1-6} -alk(en/yn)yl, C_{3-8} -cycloalk(en)yl, C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, Ar and acyl;

and

10 R^8 is selected from the group consisting of hydrogen, C_{1-6} -alk(en/yn)yl, C_{3-8} -cycloalk(en)yl, C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, Ar and $-NR^9R^{9'}$; wherein R^9 and $R^{9'}$ are independently selected from the group consisting of hydrogen, C_{1-6} -alk(en/yn)yl, C_{3-8} -cycloalk(en)yl and C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl; provided that when R^8 is $-NR^9R^{9'}$ then R^5 is not $-S-R^8$;
15 or salts thereof;

with the proviso that the compound of formula I is not:

N-[1-(phenylmethyl)-1H-indol-5-yl]-Methanesulfonamide;

N-[1-[(4-fluorophenyl)methyl]-1H-indol-5-yl]-Methanesulfonamide;

20 N-[2,3-dihydro-1-(phenylmethyl)-1H-indol-5-yl]-Methanesulfonamide;

N-[1-(phenylmethyl)-1H-indol-5-yl]-N'-4-quinolinyl-Urea;

N-[1-(phenylmethyl)-1H-indol-5-yl]-N'-4-quinolinyl-Urea; or

1-(1-benzyl-5-indolinyl)-3-phenyl-Urea;

or salts thereof.

25

2. A compound according to Claim 1, wherein at least one of R^1 or $R^{1'}$ is a hydrogen atom.

3. A compound according to any one of Claims 1 and 2, wherein both R^1 and $R^{1'}$ are hydrogen atoms.

30

4. A compound according to any one of Claims 1-3, wherein s is 0.

5. A compound according to any one of Claims 1-3, wherein s is 1.
6. A compound according any one of Claims 1-5, wherein R^2 is a hydrogen atom.
- 5 7. A compound according any one of Claims 1-4, wherein R^2 is NO_2 or a halogen atom.
8. A compound according to any one of Claims 1-3 and 5-7, wherein U is NR^{11} .
- 10 9. A compound according to Claim 8, wherein R^{11} is a hydrogen atom.
10. A compound according to any one of Claims 1-9, wherein X is CO .
11. A compound according to any one of Claims 1-9, wherein X is SO_2 .
- 15 12. A compound according to any one of Claims 1-11, wherein q is 0.
13. A compound according to any one of Claims 1-11, wherein q is 1.
- 20 14. A compound according to Claim 13, wherein Z is an oxygen atom.
15. A compound according to any one of Claims 1-14, wherein R^3 is selected from the group consisting of C_{1-6} -alk(en/yn)yl, C_{3-8} -cycloalk(en)yl, Ar, Ar- C_{1-6} -alk(en/yn)yl, Ar-oxy- C_{1-6} -alk(en/yn)yl, Ar- C_{1-6} -alk(en/yn)yl-oxy- C_{1-6} -alk(en/yn)yl and $-NR^{12}R^{12'}$; with the proviso that when R^3 is $NR^{12}R^{12'}$ then q is 0.
- 25 16. A compound according to Claim 15, wherein R^3 is $NR^{12}R^{12'}$, q is 0 and R^{12} and $R^{12'}$ are independently selected from the group consisting of hydrogen, C_{1-6} -alk(en/yn)yl, Ar and Ar- C_{1-6} -alk(en/yn)yl, or R^{12} and $R^{12'}$ together with the nitrogen atom to which they are attached form a 4-8 membered saturated or
30 unsaturated ring which optionally contains 1, 2 or 3 further heteroatoms.

17. A compound according to any one of Claims 1-16, wherein Y is of formula II, III, V, XXX, or XXXI.
18. A compound according to any of Claims 1-17, wherein Y is of formula II or III and W is a sulphur atom.
19. A compound according to any of Claims 1-17, wherein Y is of formula XXX and T is a nitrogen atom or an oxygen atom.
20. A compound according to any of Claims 1-17, wherein Y is of formula XXXI and L is C or CH.
21. A compound according to any of Claims 1-20, wherein each R⁵ is independently selected from the group consisting of C₁₋₆-alk(en/yn)yl, Ar, Ar-thio, Ar-oxy, halogen and halo-C₁₋₆-alk(en/yn)yl or or two adjacent R⁵ together with the aromatic group to which they are attached form a 4-8 membered ring which optionally contains one or two heteroatoms.
22. A compound according to any of Claims 1-21, said compounds being selected from the group consisting of:
 - N*-[4-Chloro-1-(4-trifluoromethylbenzyl)-2,3-dihydro-1H-indol-5-yl]-3,3-dimethylbutyramide;
 - N*-[4-Chloro-1-(5-chlorothiophen-2-ylmethyl)-2,3-dihydro-1H-indol-5-yl]-3,3-dimethylbutyramide;
 - [1-(4-Fluorobenzyl)-2,3-dihydro-1H-indol-5-yl]-carbamic acid propyl ester;
 - N*-[1-(4-Fluorobenzyl)-2,3-dihydro-1H-indol-5-yl]-C-phenyl-methanesulfonamide;
 - 4-Fluoro-*N*-[1-(4-fluorobenzyl)-2,3-dihydro-1H-indol-5-yl]-benzamide;
 - N*-[1-(4-Fluorobenzyl)-2,3-dihydro-1H-indol-5-yl]-3,3-dimethylbutyramide;
 - N*-[1-(4-Fluorobenzyl)-2,3-dihydro-1H-indol-5-yl]-2-thiophen-2-ylacetamide;
 - N*-[1-(4-Fluorobenzyl)-2,3-dihydro-1H-indol-5-yl]-2-(4-fluorophenyl)-acetamide;
 - 3-[1-(5-Chlorothiophen-2-ylmethyl)-2,3-dihydro-1H-indol-5-yl]-1,1-diisopropylurea;

Morpholine-4-carboxylic acid [1-(5-chlorothiophen-2-ylmethyl)-2,3-dihydro-1H-indol-5-yl]-amide;

Pyrrolidine-1-carboxylic acid [1-(5-chlorothiophen-2-ylmethyl)-2,3-dihydro-1H-indol-5-yl]-amide;

5 *[1-(5-Chlorothiophen-2-ylmethyl)-2,3-dihydro-1H-indol-5-yl]-carbamic acid 2-benzyloxyethyl ester;*

3-[1-(5-Chlorothiophen-2-ylmethyl)-2,3-dihydro-1H-indol-5-yl]-1-methyl-1-propylurea;

10 *[1-(5-Chlorothiophen-2-ylmethyl)-2,3-dihydro-1H-indol-5-yl]-carbamic acid tert-butyl ester;*

N-[1-(5-Chlorothiophen-2-ylmethyl)-2,3-dihydro-1H-indol-5-yl]-C-phenyl-methanesulfonamide;

Butane-1-sulfonic acid [1-(5-chlorothiophen-2-ylmethyl)-2,3-dihydro-1H-indol-5-yl]-amide;

15 *N-[1-(5-Chlorothiophen-2-ylmethyl)-2,3-dihydro-1H-indol-5-yl]-4-fluorobenzamide;*

N-[1-(5-Chlorothiophen-2-ylmethyl)-2,3-dihydro-1H-indol-5-yl]-2,2-dimethylpropionamide;

20 *N-[1-(5-Chlorothiophen-2-ylmethyl)-2,3-dihydro-1H-indol-5-yl]-2-phenoxyacetamide;*

N-[1-(5-Chlorothiophen-2-ylmethyl)-2,3-dihydro-1H-indol-5-yl]-3,3-dimethylbutyramide;

N-[1-(5-Chlorothiophen-2-ylmethyl)-2,3-dihydro-1H-indol-5-yl]-butyramide;

25 *Cyclopentanecarboxylic acid [1-(5-chlorothiophen-2-ylmethyl)-2,3-dihydro-1H-indol-5-yl]-amide;*

N-[1-(5-Chlorothiophen-2-ylmethyl)-2,3-dihydro-1H-indol-5-yl]-2-thiophen-2-ylacetamide;

N-[1-(5-Chlorothiophen-2-ylmethyl)-2,3-dihydro-1H-indol-5-yl]-isonicotinamide;

30 *N-[1-(5-Chlorothiophen-2-ylmethyl)-2,3-dihydro-1H-indol-5-yl]-4-dimethylaminobenzamide;*

N-[1-(5-Chlorothiophen-2-ylmethyl)-2,3-dihydro-1H-indol-5-yl]-2-(4-fluorophenyl)-acetamide;

- N*-[1-(5-Chlorothiophen-2-ylmethyl)-2,3-dihydro-1*H*-indol-5-yl]-6-trifluoromethylnicotinamide;
- 1-*tert*-Butyl-3-[1-(5-chlorothiophen-2-ylmethyl)-2,3-dihydro-1*H*-indol-5-yl]-urea;
- 5 1-[1-(5-Chlorothiophen-2-ylmethyl)-2,3-dihydro-1*H*-indol-5-yl]-3-ethylurea;
- 1-Benzyl-3-[1-(5-chlorothiophen-2-ylmethyl)-2,3-dihydro-1*H*-indol-5-yl]-urea;
- 1-[1-(5-Chlorothiophen-2-ylmethyl)-2,3-dihydro-1*H*-indol-5-yl]-3-phenethylurea;
- 1-[1-(5-Chlorothiophen-2-ylmethyl)-2,3-dihydro-1*H*-indol-5-yl]-3-thiophen-2-ylurea;
- 10 1-[1-(5-Chlorothiophen-2-ylmethyl)-2,3-dihydro-1*H*-indol-5-yl]-3-thiophen-3-ylurea;
- [1-(5-Chlorothiophen-2-ylmethyl)-2,3-dihydro-1*H*-indol-5-yl]-carbamic acid propyl ester;
- 15 2,2-Dimethyl-*N*-[6-nitro-1-(4-trifluoromethylbenzyl)-2,3-dihydro-1*H*-indol-5-yl]-propionamide;
- N*-[1-(5-Chlorothiophen-2-ylmethyl)-6-nitro-2,3-dihydro-1*H*-indol-5-yl]-2,2-dimethylpropionamide;
- 2-(4-Fluorophenyl)-*N*-[6-nitro-1-(4-trifluoromethylbenzyl)-2,3-dihydro-1*H*-indol-5-yl]-acetamide;
- 20 5-yl]-acetamide;
- N*-[1-(5-Chlorothiophen-2-ylmethyl)-6-nitro-2,3-dihydro-1*H*-indol-5-yl]-2-(4-fluorophenyl)-acetamide;
- N*-[1-(5-Chlorothiophen-2-ylmethyl)-6-nitro-2,3-dihydro-1*H*-indol-5-yl]-3,3-dimethylbutyramide;
- 25 *N*-[6-Amino-1-(5-chlorothiophen-2-ylmethyl)-2,3-dihydro-1*H*-indol-5-yl]-3,3-dimethylbutyramide;
- N*-[6-Amino-1-(4-trifluoromethylbenzyl)-2,3-dihydro-1*H*-indol-5-yl]-2,2-dimethylpropionamide;
- N*-[6-Amino-1-(5-chlorothiophen-2-ylmethyl)-2,3-dihydro-1*H*-indol-5-yl]-2,2-dimethylpropionamide;
- 30 30 *N*-[6-Amino-1-(4-trifluoromethylbenzyl)-2,3-dihydro-1*H*-indol-5-yl]-2-(4-fluorophenyl)-acetamide;

- N*-[6-Amino-1-(4-trifluoromethylbenzyl)-2,3-dihydro-1H-indol-5-yl]-3,3-dimethylbutyramide;
- N*-[6-Amino-1-(4-fluorobenzyl)-2,3-dihydro-1H-indol-5-yl]-3,3-dimethylbutyramide;
- 5 *N*-[6-Amino-1-(3-fluoro-4-trifluoromethylbenzyl)-2,3-dihydro-1H-indol-5-yl]-3,3-dimethylbutyramide;
- N*-[1-(5-Chlorothiophen-2-ylmethyl)-1H-indol-5-yl]-3,3-dimethylbutyramide;
- N*-[6-Bromo-1-(4-trifluoromethylbenzyl)-2,3-dihydro-1H-indol-5-yl]-3,3-dimethylbutyramide;
- 10 *N*-[6-Bromo-1-(5-chlorothiophen-2-ylmethyl)-2,3-dihydro-1H-indol-5-yl]-3,3-dimethylbutyramide;
- N*-[1-(4-Chlorobenzyl)-2,3-dihydro-1H-indol-5-yl]-3,3-dimethylbutyramide;
- 3,3-Dimethyl-*N*-[1-(4-trifluoromethylbenzyl)-2,3-dihydro-1H-indol-5-yl]-butyramide;
- 15 *N*-[1-(4-Isopropylbenzyl)-2,3-dihydro-1H-indol-5-yl]-3,3-dimethylbutyramide;
- N*-[1-(3-Fluoro-4-trifluoromethylbenzyl)-2,3-dihydro-1H-indol-5-yl]-3,3-dimethylbutyramide;
- N*-[1-(6-Chlorobenzo[1,3]dioxol-5-ylmethyl)-2,3-dihydro-1H-indol-5-yl]-3,3-dimethylbutyramide;
- 20 *N*-[1-(3,5-Dimethyl-1-phenyl-1H-pyrazol-4-ylmethyl)-2,3-dihydro-1H-indol-5-yl]-3,3-dimethylbutyramide;
- N*-[1-(2-Chloro-5-trifluoromethylbenzyl)-2,3-dihydro-1H-indol-5-yl]-3,3-dimethylbutyramide;
- N*-{1-[5-(4-Chlorophenoxy)-1,3-dimethyl-1H-pyrazol-4-ylmethyl]-2,3-dihydro-1H-indol-5-yl}-3,3-dimethylbutyramide;
- 25 3,3-Dimethyl-*N*-[1-(6-*p*-tolylloxy-pyridin-3-ylmethyl)-2,3-dihydro-1H-indol-5-yl]-butyramide;
- N*-{1-[6-(4-Chlorophenylsulfanyl)-pyridin-3-ylmethyl]-2,3-dihydro-1H-indol-5-yl}-3,3-dimethylbutyramide;
- 30 *N*-{1-[6-(4-Cyanophenoxy)-pyridin-3-ylmethyl]-2,3-dihydro-1H-indol-5-yl}-3,3-dimethylbutyramide;
- 3,3-Dimethyl-*N*-[1-(6-trifluoromethylpyridin-3-ylmethyl)-2,3-dihydro-1H-indol-5-yl]-butyramide;

3,3-Dimethyl-N-[1-(3-methyl-benzo[b]thiophen-2-ylmethyl)-2,3-dihydro-1H-indol-5-yl]-butyramide;

N-[1-(6-Fluoro-4H-benzo[1,3]dioxin-8-ylmethyl)-2,3-dihydro-1H-indol-5-yl]-3,3-dimethylbutyramide;

5 *3,3-Dimethyl-N-[1-(6-phenoxy-pyridin-3-ylmethyl)-2,3-dihydro-1H-indol-5-yl]-butyramide;*

3,3-Dimethyl-N-[1-(3-methyl-5-phenyl-isoxazol-4-ylmethyl)-2,3-dihydro-1H-indol-5-yl]-butyramide;

10 *N-(1-Benzo[b]thiophen-2-ylmethyl-2,3-dihydro-1H-indol-5-yl)-3,3-dimethylbutyramide;*

N-{1-[1-(4-Fluorophenyl)-5-methyl-1H-pyrazol-4-ylmethyl]-2,3-dihydro-1H-indol-5-yl}-3,3-dimethylbutyramide;

3,3-Dimethyl-N-[1-(5-methylthiophen-2-ylmethyl)-2,3-dihydro-1H-indol-5-yl]-butyramide;

15 *3,3-Dimethyl-N-[1-(4-pyrrol-1-yl-benzyl)-2,3-dihydro-1H-indol-5-yl]-butyramide;*

N-[1-(4-Chlorobenzyl)-2,3-dihydro-1H-indol-5-yl]-2-(4-fluorophenyl)-acetamide;

20 *2-(4-Fluorophenyl)-N-[1-(4-trifluoromethylbenzyl)-2,3-dihydro-1H-indol-5-yl]-acetamide;*

2-(4-Fluorophenyl)-N-[1-(4-isopropylbenzyl)-2,3-dihydro-1H-indol-5-yl]-acetamide;

2-(4-Fluorophenyl)-N-[1-(3-fluoro-4-trifluoromethylbenzyl)-2,3-dihydro-1H-indol-5-yl]-acetamide;

25 *N-[1-(6-Chlorobenzo[1,3]dioxol-5-ylmethyl)-2,3-dihydro-1H-indol-5-yl]-2-(4-fluorophenyl)-acetamide;*

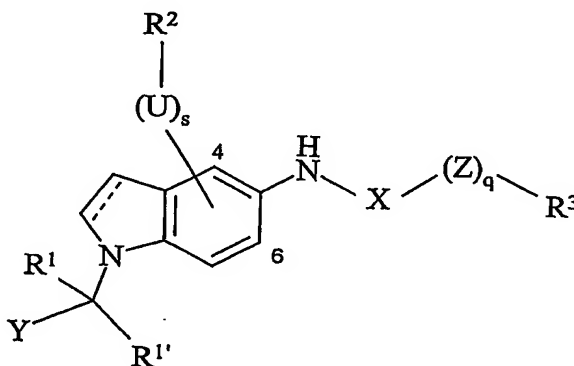
N-[1-(3,5-Dimethyl-1-phenyl-1H-pyrazol-4-ylmethyl)-2,3-dihydro-1H-indol-5-yl]-2-(4-fluorophenyl)-acetamide;

30 *N-[1-(2-Chloro-5-trifluoromethylbenzyl)-2,3-dihydro-1H-indol-5-yl]-2-(4-fluorophenyl)-acetamide;*

N-{1-[5-(4-Chlorophenoxy)-1,3-dimethyl-1H-pyrazol-4-ylmethyl]-2,3-dihydro-1H-indol-5-yl}-2-(4-fluorophenyl)-acetamide;

- N*-{1-[6-(4-Cyanophenoxy)-pyridin-3-ylmethyl]-2,3-dihydro-1*H*-indol-5-yl}-2-(4-fluorophenyl)-acetamide;
- 2-(4-Fluorophenyl)-*N*-[1-(3-methyl-benzo[*b*]thiophen-2-ylmethyl)-2,3-dihydro-1*H*-indol-5-yl]-acetamide;
- 5 *N*-[1-(6-Fluoro-4*H*-benzo[1,3]dioxin-8-ylmethyl)-2,3-dihydro-1*H*-indol-5-yl]-2-(4-fluorophenyl)-acetamide;
- 2-(4-Fluorophenyl)-*N*-[1-(6-phenoxy-pyridin-3-ylmethyl)-2,3-dihydro-1*H*-indol-5-yl]-acetamide;
- 10 *N*-(1-Benzo[*b*]thiophen-2-ylmethyl-2,3-dihydro-1*H*-indol-5-yl)-2-(4-fluorophenyl)-acetamide;
- 2-(4-Fluorophenyl)-*N*-{1-[1-(4-fluorophenyl)-5-methyl-1*H*-pyrazol-4-ylmethyl]-2,3-dihydro-1*H*-indol-5-yl}-acetamide;
- 2-(4-Fluorophenyl)-*N*-[1-(5-methylthiophen-2-ylmethyl)-2,3-dihydro-1*H*-indol-5-yl]-acetamide; and
- 15 2-(4-Fluorophenyl)-*N*-[1-(4-pyrrol-1-yl-benzyl)-2,3-dihydro-1*H*-indol-5-yl]-acetamide, or
- a pharmaceutically acceptable salt thereof.

23. A pharmaceutical composition comprising one or more pharmaceutically acceptable carriers or diluents and a compound according to any one of claims 1-22.
- 20
24. Use of a pharmaceutical composition comprising one or more pharmaceutically acceptable carriers or diluents and a compound of the general formula I
- 25



(I)

wherein

the dotted line represents an optional bond;

5

R^1 and $R^{1'}$ are independently selected from the group consisting of hydrogen, C_{1-6} -alk(en/yn)yl, C_{3-8} -cycloalk(en)yl, C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, hydroxy- C_{1-6} -alk(en/yn)yl, hydroxy- C_{3-8} -cycloalk(en)yl, hydroxy- C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, halo- C_{1-6} -alk(en/yn)yl, halo- C_{3-8} -cycloalk(en)yl, halo- C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, cyano- C_{1-6} -alk(en/yn)yl, cyano- C_{3-8} -cycloalk(en)yl and cyano- C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl; or

10

R^1 and $R^{1'}$ together with the carbon atom to which they are attached form a 3-8 membered saturated or unsaturated ring which optionally contains 1 or 2 heteroatoms;

15

s is 0 or 1;

U is O, NR^{11} , S, SO_2 , SO_2NR^{11} , CO-O or CO- NR^{11} ; wherein R^{11} is selected from the group consisting of hydrogen, C_{1-6} -alk(en/yn)yl, C_{3-8} -cycloalk(en)yl, C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl; or R^2 and R^{11} together with the nitrogen atom to which they are attached form a 4-8 membered saturated or unsaturated ring which optionally contains 1, 2 or 3 further heteroatoms;

20

R^2 is selected from the group consisting of hydrogen, C_{1-6} -alk(en/yn)yl, C_{3-8} -cycloalk(en)yl, C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, Ar, Ar- C_{1-6} -alk(en/yn)yl, Ar- C_{3-8} -cycloalk(en)yl, Ar- C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, acyl, hydroxy- C_{1-6} -alk(en/yn)yl, hydroxy- C_{3-8} -cycloalk(en)yl, hydroxy- C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, halogen, halo- C_{1-6} -alk(en/yn)yl, halo- C_{3-8} -cycloalk(en)yl, halo- C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, cyano, cyano- C_{1-6} -alk(en/yn)yl, cyano- C_{3-8} -cycloalk(en)yl, cyano- C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, $-NO_2$, $NR^{10}R^{10'}$ - C_{1-6} -alk(en/yn)yl, $NR^{10}R^{10'}$ - C_{3-8} -cycloalk(en)yl and $NR^{10}R^{10'}$ - C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl; wherein

25

30

R^{10} and $R^{10'}$ are independently selected from the group consisting of hydrogen, C_{1-6} -alk(en/yn)yl, C_{3-8} -cycloalk(en)yl, C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, hydroxy- C_{1-6} -alk(en/yn)yl, hydroxy- C_{3-8} -cycloalk(en)yl, hydroxy- C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, halo- C_{1-6} -alk(en/yn)yl, halo- C_{3-8} -cycloalk(en)yl, halo- C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, cyano- C_{1-6} -alk(en/yn)yl, cyano- C_{3-8} -cycloalk(en)yl and cyano- C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, or

R^{10} and $R^{10'}$ together with the nitrogen atom to which they are attached form a 4-8 membered saturated or unsaturated ring which optionally contains 1, 2 or 3 further heteroatoms;

with the proviso that when R^2 is NO_2 , halogen or cyano then s is 0; and with the proviso that when R^2 is a hydrogen atom or acyl and s is 1 then U is NR^{11} , O or S;

wherein the group $-(U)_s-R^2$ is linked to position 4 or 6 of the indole or indoline;

q is 0 or 1;

Z is O or S;

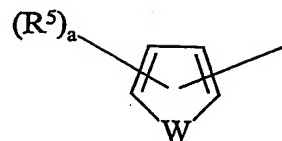
X is CO or SO_2 ; with the proviso that q is 0 when X is SO_2 ;

R^3 is selected from the group consisting of C_{1-6} -alk(en/yn)yl, C_{3-8} -cycloalk(en)yl, heterocycloalk(en)yl, C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, C_{1-6} -alk(en/yn)yl- C_{3-8} -cycloalk(en)yl, C_{1-6} -alk(en/yn)yl-heterocycloalk(en)yl, Ar, Ar- C_{1-6} -alk(en/yn)yl, Ar- C_{3-8} -cycloalk(en)yl, Ar-heterocycloalk(en)yl, Ar- C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, Ar- C_{1-6} -alk(en/yn)yl- C_{3-8} -cycloalk(en)yl, Ar- C_{1-6} -alk(en/yn)yl-heterocycloalk(en)yl, C_{1-6} -alk(en/yn)yl-oxy- C_{1-6} -alk(en/yn)yl, C_{3-8} -cycloalk(en)yl-oxy- C_{1-6} -alk(en/yn)yl, C_{1-6} -alk(en/yn)yl-oxy- C_{3-8} -cycloalk(en)yl, C_{1-6} -alk(en/yn)yl-oxy-heterocycloalk(en)yl, Ar-oxy- C_{1-6} -alk(en/yn)yl, Ar- C_{1-6} -alk(en/yn)yl-oxy- C_{1-6} -alk(en/yn)yl, C_{1-6} -alk(en/yn)yl-oxy-carbonyl- C_{1-6} -alk(en/yn)yl, C_{3-8} -cycloalk(en)yl-oxy-carbonyl- C_{1-6} -alk(en/yn)yl, C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl-oxy-carbonyl- C_{1-6} -alk(en/yn)yl, hydroxy- C_{1-6} -alk(en/yn)yl, hydroxy- C_{3-8} -cycloalk(en)yl, hydroxy-heterocycloalk(en)yl,

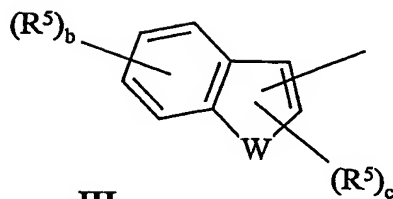
hydroxy-C₃₋₈-cycloalk(en)yl-C₁₋₆-alk(en/yn)yl, hydroxy-C₁₋₆-alk(en/yn)yl-C₃₋₈-cycloalk(en)yl, hydroxy-C₁₋₆-alk(en/yn)yl-heterocycloalk(en)yl, halo-C₁₋₆-alk(en/yn)yl, halo-C₃₋₈-cycloalk(en)yl, halo-heterocycloalk(en)yl, halo-C₃₋₈-cycloalk(en)yl-C₁₋₆-alk(en/yn)yl, halo-C₁₋₆-alk(en/yn)yl-C₃₋₈-cycloalk(en)yl, halo-C₁₋₆-alk(en/yn)yl-heterocycloalk(en)yl, halo-C₁₋₆-alk(en/yn)yl-Ar, halo-C₃₋₈-cycloalk(en)yl-Ar, halo-C₃₋₈-cycloalk(en)yl-C₁₋₆-alk(en/yn)yl-Ar, halo-C₁₋₆-alk(en/yn)yl-C₃₋₈-cycloalk(en)yl-Ar, cyano-C₁₋₆-alk(en/yn)yl, cyano-C₃₋₈-cycloalk(en)yl, cyano-heterocycloalk(en)yl, cyano-C₃₋₈-cycloalk(en)yl-C₁₋₆-alk(en/yn)yl, cyano-C₁₋₆-alk(en/yn)yl-C₃₋₈-cycloalk(en)yl, cyano-C₁₋₆-alk(en/yn)yl-heterocycloalk(en)yl, acyl-C₁₋₆-alk(en/yn)yl, acyl-C₃₋₈-cycloalk(en)yl, acyl-heterocycloalk(en)yl, acyl-C₃₋₈-cycloalk(en)yl-C₁₋₆-alk(en/yn)yl, acyl-C₁₋₆-alk(en/yn)yl-C₃₋₈-cycloalk(en)yl, acyl-C₁₋₆-alk(en/yn)yl-heterocycloalk(en)yl and -NR¹²R^{12'}, optionally substituted NR¹²R^{12'}-C₁₋₆-alk(en/yn)yl, optionally substituted NR¹²R^{12'}-C₃₋₈-cycloalk(en)yl, optionally substituted NR¹²R^{12'}-C₃₋₈-cycloalk(en)yl-C₁₋₆-alk(en/yn)yl; wherein R¹² and R^{12'} are independently selected from the group consisting of hydrogen, C₁₋₆-alk(en/yn)yl, C₃₋₈-cycloalk(en)yl, C₃₋₈-cycloalk(en)yl-C₁₋₆-alk(en/yn)yl, Ar, Ar-C₁₋₆-alk(en/yn)yl, Ar-C₃₋₈-cycloalk(en)yl, Ar-C₃₋₈-cycloalk(en)yl-C₁₋₆-alk(en/yn)yl, hydroxy-C₁₋₆-alk(en/yn)yl, hydroxy-C₃₋₈-cycloalk(en)yl, hydroxy-C₃₋₈-cycloalk(en)yl-C₁₋₆-alk(en/yn)yl, halo-C₁₋₆-alk(en/yn)yl, halo-C₃₋₈-cycloalk(en)yl, halo-C₃₋₈-cycloalk(en)yl-C₁₋₆-alk(en/yn)yl, cyano-C₁₋₆-alk(en/yn)yl, cyano-C₃₋₈-cycloalk(en)yl and cyano-C₃₋₈-cycloalk(en)yl-C₁₋₆-alk(en/yn)yl, or R¹² and R^{12'} together with the nitrogen atom to which they are attached form a 4-8 membered saturated or unsaturated ring which optionally contains 1, 2 or 3 further heteroatoms; with the proviso that when R³ is NR¹²R^{12'} then q is 0;

and

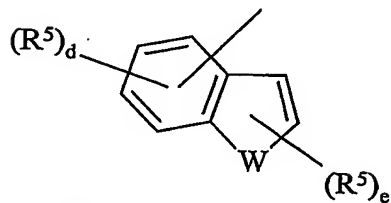
Y represents a group of formula II, III, IV, V, , VI, XXX and XXXI:



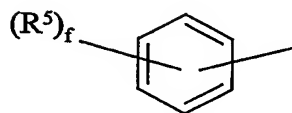
II



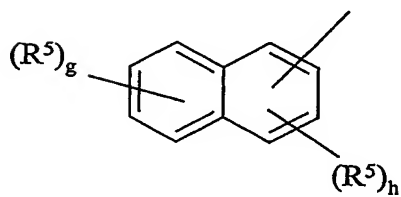
III



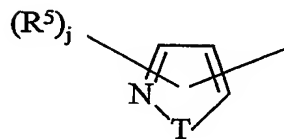
IV



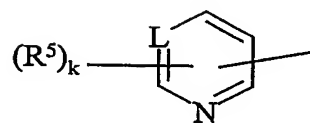
V



VI



XXX



XXXI

or

wherein

5 the line represents a bond attaching the group represented by Y to the carbon atom;

W is O or S;

10 T is N, NH or O;

L is N, C or CH;

a is 0, 1, 2 or 3;

5 b is 0, 1, 2, 3 or 4;

c is 0 or 1;

d is 0, 1, 2 or 3;

10

e is 0, 1 or 2;

f is 0, 1, 2, 3, 4 or 5;

15

g is 0, 1, 2, 3 or 4;

h is 0, 1, 2 or 3;

20

j is 0, 1, 2 or 3; with the proviso that when T is a nitrogen atom then j is 0, 1, 2 or 3; and when T is NH or an oxygen atom then j is 0, 1 or 2;

k is 0, 1, 2, 3 or 4; and

25

each R^5 is independently selected from the group consisting of a C_{1-6} -alk(en/yn)yl, C_{3-8} -cycloalk(en)yl, C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, Ar, Ar- C_{1-6} -alk(en/yn)yl, Ar-thio, Ar-oxy, acyl, C_{1-6} -alk(en/yn)yl, C_{3-8} -cycloalk(en)yl, C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, C_{3-8} -cycloalk(en)yl, halo- C_{1-6} -alk(en/yn)yl, halo- C_{3-8} -cycloalk(en)yl, halo- C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, -CO-NR⁶R^{6'}, cyano, cyano- C_{1-6} -alk(en/yn)yl, cyano- C_{3-8} -cycloalk(en)yl, cyano- C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, -NR⁷R^{7'}, -S-R⁸ and -SO₂R⁸, or two adjacent R^5 together with the aromatic group to which they are attached form a 4-8 membered ring which optionally contains one or two heteroatoms;

30

R^6 and $R^{6'}$ are independently selected from the group consisting of hydrogen, C_{1-6} -alk(en/yn)yl, C_{3-8} -cycloalk(en)yl, C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl and Ar;

R^7 and $R^{7'}$ are independently selected from the group consisting of hydrogen, C_{1-6} -alk(en/yn)yl, C_{3-8} -cycloalk(en)yl, C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, Ar and acyl;

and

R^8 is selected from the group consisting of hydrogen, C_{1-6} -alk(en/yn)yl, C_{3-8} -cycloalk(en)yl, C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl, Ar and $-NR^9R^{9'}$; wherein R^9 and $R^{9'}$ are independently selected from the group consisting of hydrogen, C_{1-6} -alk(en/yn)yl, C_{3-8} -cycloalk(en)yl and C_{3-8} -cycloalk(en)yl- C_{1-6} -alk(en/yn)yl; provided that when R^8 is $-NR^9R^{9'}$ then R^5 is not $-S-R^8$;

or salts thereof

for increasing ion flow in a potassium channel of a mammal such as a human.

25. Use according to Claim 24 for the prevention, treatment or inhibition of a disorder or condition being responsive to an increased ion flow in a potassium channel, such disorder or condition is preferably a disorder or condition of the central nervous system.
26. Use according to Claim 25, wherein said disorder or disease is selected from the group consisting of seizure disorders such as convulsions, epilepsy and status epilepticus.
27. Use according to Claim 25, characterized in that the disorder or condition is selected from the group consisting of neuropathic and migraine pain disorders such as allodynia, hyperalgesic pain, phantom pain, neuropathic pain related to diabetic neuropathy and neuropathic pain related to migraine

28. Use according to Claim 25, characterized in that the disorder or condition is selected from the group consisting of anxiety disorders such as anxiety, generalized anxiety disorder, panic anxiety, obsessive compulsive disorder, social phobia, performance anxiety, post-traumatic stress disorder, acute stress reaction, adjustment disorders, hypochondriacal disorders, separation anxiety disorder, agoraphobia, specific phobias, anxiety disorder due to general medical condition and substance-induced anxiety disorder.
29. Use according to Claim 25, characterized in that the disorder or condition is selected from the group consisting of and neurodegenerative disorders such as Alzheimer's disease, Huntington's chorea, multiple sclerosis, amyotrophic lateral sclerosis, AIDS-induced encephalopathy and other infection-related encephalopathies being caused by rubella viruses, herpes viruses, borrelia and by unknown pathogens, Creutzfeld-Jakob disease, Parkinson's disease, trauma-induced neurodegenerations.
30. Use according to Claim 25, characterized in that the disorder or condition is selected from the group consisting of neuronal hyperexcitation states such as in medicament withdrawal or by intoxication.